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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/828,462	04/06/2001	Michael Comer	3184	6911

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CHICAGO, IL 60602

EXAMINER
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EBRAHIMI DEHKORDY, SAEID

ART UNIT	PAPER NUMBER
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2625

DATE MAILED: 07/17/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 09/828,462	<b>Applicant(s)</b> COMER ET AL.	
	<b>Examiner</b> Saeid Ebrahimi-dehKordy	<b>Art Unit</b> 2626	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

**A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.**

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-3, 5-10 and 12-15 is/are pending in the application.  
     4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-3, 5-10 and 12-15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
     a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date ____. | 6) <input type="checkbox"/> Other: ____.  |

### **Response to Amendment**

On the amendment filed on May, 1 2006 applicant argues that while Desormeaux teach the use of piezo-electric print head it does not teach printing device having internet connectivity, Examiner disagrees and points out on page 3 paragraph 0026 on lines 20-23 where the images could and would be downloaded from other sources, such as internet or world wide web, in fact the combinations of Desormeaux and Venkatraman teach the present invention by providing the print engine of the Venkatraman with the hardware and internet connectivity which would be modified by the Piezo-electric print head of the Desormeaux which would also be able to connect to the internet to download data and images.

### **Claim Rejections - 35 USC § 103**

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-3, 5-10 and 12-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Venkatraman et al (U.S. patent 6,170,007) in view of Desormeaux (Pub. No.: US 20020070988)

**Regarding claim 1** Venkatraman et al disclose: Internet hardware and software for providing the print engine with Internet connectivity (please note Fig.5 item 10 the printer and the item 100 the internet, also please note Fig.1B the printer comprising web

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page server item 18 and device –specific hardware and software embedded in the processor, column 4 lines 22-32 and column 4 lines 65-67 and column 5 lines 1-3) including a microprocessor communicating with the printer hardware and software (please note Fig.1B items 200 the processor, item 300 the hardware and the software embedded in the processor, column 4 lines 21-29) the microprocessor comprising an embedded Internet server having a valid IP address (please note Figs.1A&B, column 3 lines 21-45) said microprocessor also containing Ethernet MAC and system controller (note Fig.1B, column 4 lines 9-31 where the microprocessor 200 and bidirectionally in contact with the memory 210 and the I/O circuitry 220 with Ethernet circuitry) printer hardware and software providing a functioning printer ( note Venkatraman, Fig.1B item 300) However Venkatraman et al do not disclose: An ink jet print engine with Internet connectivity, comprising a piezoelectric printhead for dispensing ink onto a substrate. On the other hand Desormeaux discloses: An ink jet print engine with Internet connectivity (note page 3 paragraph 0026 where the inkjet printer is capable of connectivity for example to download images from internet, note Fig.4&5) and a piezoelectric printhead for dispensing ink onto a substrate (note page 3 paragraph 0023 where the inkjet printer is capable of using Piezoelectric print head). Therefore it would have been obvious to a person of ordinary skill in art at the time of the invention to modify Venkatraman et al's invention according to the teaching of Desormeaux, where Desormeaux teaches the way piezoelectric print head which is part of the printer which connects to the internet as in the case of Desormeaux's is used instead for purpose of optimizing the printer.

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**Regarding claim 2** Venkatraman et al disclose: The ink jet print engine of claim 1, wherein the printer software stores one or more valid IP addresses of servers corresponding to maintenance or service centers for one or more components of the print engine (please note column 7 lines 8-17 where the address or URL of for example service contract also note column 4 lines 9-20).

**Regarding claim 3** Venkatraman et al disclose: the ink jet print engine of claim 1 wherein said printer hardware or software is capable of providing diagnostic information concerning said printer and which is transmitted over the internet (note column 3 lines 21-30 where the status of printer 10 would be transmitted over the internet through HTTP protocol).

**Regarding claim 5** Venkatraman et al disclose: the ink jet print engine of claim 1 wherein the system controller includes memory DMA, interrupts and timer (note Fig.1B item 210 the memory)

**Regarding claim 6** Venkatraman et al disclose: The ink jet print engine of claim 1, wherein said microprocessor contains cache, I/O, real time operating systems, device driver software and communications protocol software. (please note column 4 lines 65-67 and column 5 lines 1-3).

**Regarding claim 7** Venkatraman et al disclose: The ink jet print engine of claim 1, wherein the printer comprises integrated networking software (please note column 4 lines 65-67 and column 5 lines 1-3).

**Regarding claim 8** Venkatraman et al disclose: The ink jet print engine of claim 1, wherein the microprocessor uses an RTOS operating system (please note column 4 lines 59-64).

**Regarding claim 9 and 10** Venkatraman et al disclose: Internet hardware and software for providing the print engine with Internet connectivity (please note Fig.5 item 10 the printer and the item 100 the internet, also please note Fig.1B the printer comprising web page server item 18 and device –specific hardware and software embedded in the processor, column 4 lines 22-32 and column 4 lines 65-67 and column 5 lines 1-3) including a microprocessor communicating with the printer hardware and software (please note Fig.1B items 200 the processor, item 300 the hardware and the software embedded in the processor, column 4 lines 21-29) the microprocessor comprising an embedded Internet server having a valid IP address (please note Figs.1A&B, column 3 lines 21-45) said microprocessor also containing Ethernet MAC and system controller (note Fig.1B, column 4 lines 9-31 where the microprocessor 200 and bidirectionally in contact with the memory 210 and the I/O circuitry 220 with Ethernet circuitry) printer hardware and software providing a functioning printer (note Venkatraman, Fig.1B item 300) microprocessor capable of reporting at least diagnostic information about said printer hardware over the internet (note column 3 lines 21-30 where device 10, the printer, is capable of transmitting device status or diagnostic information and receive status information of device) However Venkatraman et al do not clearly teach: An ink jet print engine with Internet connectivity, comprising a piezoelectric printhead for dispensing ink onto a substrate. On the other hand

Desormeaux discloses: An ink jet print engine with Internet connectivity (note page 3 paragraph 0026 where the inkjet printer is capable of connectivity for example to download images from internet, note Fig.4&5) and a piezoelectric printhead for dispensing ink onto a substrate (note page 3 paragraph 0023 where the inkjet printer is capable of using Piezoelectric print head). Therefore it would have been obvious to a person of ordinary skill in art at the time of the invention to modify Venkatraman et al's invention according to the teaching of Desormeaux , where Desormeaux teaches the way piezoelectric print head which is part of the printer which connects to the internet as in the case of Desormeaux's is used instead for purpose of optimizing the printer.

**Regarding claim 12** Venkatraman et al disclose: The printer device of Claim 10, wherein said microprocessor gathers statistics concerning said printer device (please note column 4 lines 22-32)

**Regarding claim 13** Venkatraman et al disclose: the printer device of claim 12 further comprising said internet connection hardware and software reporting said statistics over the internet (note column 3 lines 21-30, where the status information is transmitted over the internet through HTTP).

**Regarding claim 14** Venkatraman et al disclose: The printer device of Claim 10, further comprising said printer device acting as an independent Internet server (please note column 4 lines 13-18).

**Regarding claim 15** Venkatraman et al disclose: The printer device of Claim 10, wherein said Internet connection hardware and software uses TCP/IP protocols (please note column 3 lines 9-20).

### **Conclusion**

3. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

### **Contact Information**

- Any inquiry concerning this communication or earlier communications from the examiner should be directed to *Saeid Ebrahimi-Dehkordy* whose telephone number is (571) 272-7462.

The examiner can normally be reached on Monday through Friday from 8:00 a.m. to 5:30 p.m. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kimberly Williams, can be reached at (571) 272-7471.

**Any response to this action should be mailed to:**

Assistant Commissioner for Patents  
Washington, D.C. 20231



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**Or faxed to:**

(703) 872-9306, or (703) 308-9052 (for **formal** communications; please mark

**"EXPEDITED PROCEDURE"**)

**Or:**

(703) 306-5406 (for **informal** or **draft** communications, please label "PROPOSED" or "DRAFT")

**Hand delivered responses** should be brought to Knox building on 501 Dulany Street, Alexandria, VA.

Any inquiry of a general nature or relating to the status of this application should be directed to the Group Receptionist whose telephone number is (703) 305-4750.

Saeid Ebrahimi-Dehkordy  
Patent Examiner  
Group Art Unit 2625  
July 5, 2006



KING Y. POON  
PRIMARY EXAMINER